PATENT

Application # 10/045,980

Attorney Docket # 2001-0027 (1014-162)


## AMENDMENTS


## AMENDMENTS TO THE CLAIMS


1. (Currently amended) In a communications environment where multiple instances of diverse access protocols share a communications media, where it is desired that transmissions from one instance not collide with transmissions form another instance, and each instance of an access protocol has the ability to restrict access to the media for all stations in that instance practicing that protocol from a set of stations in that instance, and the stations having the ability to restrict access in each instance can all communicate with the other stations able to restrict access, wherein a method of permitting interoperability of the instances of the access protocols includes the steps of:

assigning each instance of each access protocol to separate phases occurring in allocated time periods;

communicating the allocated time periods for each protocol instance to the stations having the ability to restrict traffic for that protocol instance;

for a selected protocol, assembling spoofing frames from an RTS frame transmitted by APs associated with the selected protocol, followed by a CTS frame transmitted by stations associated with the selected protocol; and

restricting access of stations in each protocol instance to only those time periods assigned to that protocol instance.


2. (Original) The method of claim 1, where:

using 802.11 DCF in the access protocol for at least one of the phases;

enabling the stations transmitting in this phase with an to ability to restrict access to 802.11 AP's; and

restricting access in other phases by stations transmitting in this phase by having 802.11 APs trigger the transmission of spoofing frames with duration fields set to prevent access by 802.11 stations to the medium in other phases.

3.  (Original) The method of claim 2, including a step of:

practicing the HIPERLAN/2 access protocol in HIPERLAN/2 stations in at least one of the phases.

4.  (Original) The method of claim 2, including a step of:

assembling the spoofing frames transmitted from an 802.11 RTS frame transmitted by the APs, followed by an 802.11 CTS frame transmitted by 802.11 stations.

5.  (Original) The method of claim 2, including a step of:

assembling the spoofing frames transmitted from an 802.11 RTS frame transmitted by the APs, followed by an 802.11 CTS frames transmitted by 802.11 stations, followed by other CTS frames transmitted by APs.

6.  (Original) The method of claim 2, including a step of:

where the spoofing frames transmitted consist of a single 802.11 CTS frame transmitted by each of the APs.

7.  (Original) The method of claim 2, including a step of:

ssembling the spoofing frames transmitted from a single 802.11 data frame transmitted by each of the APs.

8.  (Original) The method of claim 2, including a step of:

arranging start times of the phases to be on average periodic in nature, allowing a super-frame structure to be defined.

9. (Original) The method of claim 2, including steps of:

predetermining start and end times of at least one of the phases; and

making the start and end times known to all stations needing to restrict access during that phase so that no communications is required between stations restricting access to the media for that phase.

10. (Currently amended) In a communication environment in which access ports of systems are individually operative at overlapping frequencies in one of two active operative WLAN systems each operating in a common channel each under a different controlling standard, wherein a method of permitting interoperability of the two systems includes steps of:

establishing a superframe within which contention is substantially eliminated and resolved by:

limiting each system to separate phases of allocated defined contention periods for differing;

for a selected standard, assembling spoofing frames from an RTS frame transmitted by APs associated with the selected standard, followed by a CTS frame transmitted by stations associated with the selected standard; and

selecting contention periods to accommodate variants of operating standards of the operative WLAN systems; and

preventing access ports of one standard from transmitting during time periods allotted to access ports of another standard for transmission.

11. (Original) The method of claim 10, including a step of:

. establishing transmission for one of the two WLAN systems during a contention period of the other WLAN.

12. (Original) The method of claim 11, including a step of:

separating 802.11 CFP intervals form H/2 MAC-frame intervals by a spoofing/blocking frame sequence.

13. (Original) The method of claim 12, including a step of:

adding additional beacons in an 802.11 interval to prevent jitter.

14. (Original) The method of claim 13, including a step of:

ending a contention free period for 802.11 after completion of HIPERLAN/2 transmissions.

15. (Original) The method of claim 14, including a step of:

synchronizing super-frames by use of a synchronizing beacon.